Thank you so much for the honor to be invited at this event and on this stage. I'm not here because I'm one of the leading global health professors in the world when it comes to research and developing institutions. I'm here because I have most views on YouTube. (Laughter, applause.) And the last panel addressed the importance of bringing the whole issue out on social media. And I will stretch my presentation from the analysis of data all the way to how we can communicate it and the enormous challenge especially among the public in the richest countries.

First, gratitude, and I'm here in America and I have to thank the taxpayers of the United States for demographic health survey. Thank you very much. (Applause.) And it is the ongoing activity over the decades that we appreciate so much and the stimulation it has led to others and that you have led the way to provide the data free and for use for the entire world.

We also thank UNICEF for following up with multiple indicator cluster surveys and of course all the researchers across the world who spearhead using this data and go on and do future surveys and who also challenge United Nation to provide this at the child mortality estimates in the best possible way.

So for United Nations are leading and that's when WHO, UNICEF and all come together, we have seen that it becomes more functional and better in communication. I also have to thank, of course, the research community but especially researchers and institutions across the world that are leading now.

I've been so impressed to see in Karachi, to see in Ghana how new institutions are being built to address research on child mortality at the cutting edge highest level. That's very promising that that is moving out to countries.

And why do I thank so much about that? Because I'm just a professor who stands on the shoulders of all these people who do the job, they who collect the data, who compile the data, who analyze it.

And I also today wear the tie of the Ugandan bureau of statistics – (scattered laughter) – to show that the civil servants even in the low income countries that play such an important role in giving us the data and evidence which we can use. So what is it we need to do?

Let me – let me immediately go in to show you the graph, one of my favorite graphs here. And each bubble here is a country. The size of the bubble is the size of the population. The big one is China. This one is India.

And this is – I hope you can see it – 1960. It's 50 years approach of what happens. The color here of the continent is the color of the bubble. So the red is East Asia, the light blue South Asia, dark blue here is Africa. Whoops. (Laughter.) And I thought I fainted, so – (laughter).

The countries down here, the brown one is Europe, red one there is Japan, here United States of America. And what do I show here? I show the size of families or fertility rate – one,

two, three, four, five, six, seven, eight children per woman. If you say fertility rate, you are dead on social media. You have to say babies per woman. Then it's understood.

On this is child mortality – 50, hundred, hundred and fifty, 200. I have to go all the way to 350 when I display the situation in 1960. And you can see at that time the talk or the categorization into a developed world and the developing world was fact-based because there was almost no country whatsoever in between.

Look here – a hundred children were dying per thousand up there and here there were six children per woman and more in that direction. It was worlds apart. What has happened? Have we progressed? We've heard today, and I will now show you this by giving you the rates. Here we go. Ready, set, go. Can you see how child mortality is dropping here? This is China. This is India.

And then family planning starts to work and child mortality drops even further. And all the countries follow. Africa is stretching out. Some African countries are very successful. And when we come into this century, all the world gathers down into this corner and here we are today. What a progress! (Applause.) Can you see the division between the developed and the developing world?

No, it's gone. It's only in our mind. It's only in the mindset and in the cartoons of Tin-Tin you can see it. In the world as a reality, it has merged. And can you see people have an idea that sub-Saharan Africa is like this or is like that. What a difference within Sub-Saharan Africa. And what a progress even sub-Saharan Africa has made when we go up from here and you can see it's a completely different world we have today.

Now, here I also show you there are strong relation between how many children a couple get or decide to get – how many the woman choose to have. And how many of them that dies. It's a very clear relationship. And it goes both ways.

And we have come so far away from that idea when family planning should be promoted as the way to get out of poverty to making it a part of sexual and reproductive health and a right for women because it works just fine providing it that way. It works just fine because the families choose. As soon as they see their children surviving, look here for instance. Bangladesh was there 1972, at its independence. And what has Bangladesh done since?

It's a miracle, isn't it? It's an absolute miracle. We have seen it come down here and you can see very clearly how better survival of children gets a higher demand for family planning and getting fewer children enables families to invest more in them as it is at the national level. There is no one way direction between those two.

And I want to show you the other indicator which I like. There's one think I really love. It's money. You don't think that when you're a professor in public health you shouldn't love money. I think so because we in public health, we know so well how money should be used. (Laughter.) That's why we want to talk about money.

And I noted that the honorable ministers here from India and Europe was very clear that economic growth was part of the equation of better health. And in both way also the direction goes. A healthier population, surviving children, smaller families that can invest means better opportunity for growth and better economic growth in the country gives more resources to invest.

Here, I put therefore dollar per person – \$400, \$4,000, \$40,000. Our world is very unjust. I have to have two differences in zeroing income in the countries. If we say that there is a great disparity in child survival, it really is even more in money – one hundred-fold more money per person in the best country than in the worst. And here I have child mortality as in the other ones.

So what has happened? You can see that the Western world was indeed down here. What was called the developing world had more of a disparity when it came to money than when it was fertility rate. But you will see by what's happening here is that child mortality is coming – look at – look at China.

China first made its population healthy and got education and got things in order, changed policy and then starts the economic growth, a little here – here we are in '93 and '94. See how they are growing? And the emerging economies are all gathering down here. India is joining very fast from up here. And healthy first, then wealthy. That's how the world is going today. (Applause.)

And it goes that way for two reasons, because it's the right thing to do ethically but it's also a damned clever investment. It's a very clever investment – easy to convince a minister of finance that that's the way you should go. So now, to look this little carefully, you can see child mortality has come down to the level where I have to stretch this indicator. So I will do the following.

Look, I'll do the following. I put it on this level where I stretch out the low mortality rate and I push them together, the high rates. This is called – (inaudible). I want to call it a rubber scale. It's more relaxed. That's what I did with money also. I took apart money for this with low income. I pressed it together. And can you see the amazing linear relation between money and child survival. If you are rich, kids survive.

But there is a difference of achievement. Some countries are down here. Some countries are up here on the same income level as they are here in the middle and they are up here. That's the inequity in the countries and that's the bad investments. That's why you need to know how to invest to make the best possible out of your money.

But there is no country down here in the human right paradise where you don't have money and you have child survival. That doesn't exist. That is what I call end of equity line here. Can you see it? No country falls below this. But you can make your way down like this. And the other thing you see is there is also no clear-cut limit here between developing countries and developed countries.

There are countries all the way – all the way up here. The good thing is we have no country above that lien any longer. We have no country above that line any longer. So what I want to show you here is my own country. Swedes are quite obsessed about Sweden. We happen to be the country that export most arms per inhabitant in the whole world and we have had peace for 200 years.

So it's very difficult for us to come to grip with those statistical facts. Yeah, it's sad. We don't understand why it is like this. Our country has gone through this very peaceful period. I go backwards with Sweden and I go backwards to the year when my grandmother was born, in 1890. She took care of me when I was a child and my mother had tuberculosis. And when she was born, Sweden had the same child mortality as the worst of countries today.

Isn't it amazing? That means in my life, in my living memory in my family, I bridge the entire variation of child mortality in the world. And from there, with peace and Sweden more than anything else had luck in history. We've been so lucky, staying out of the war, having natural resources, having good neighbors, having good collaborations. So with all that luck, it wasn't surprising that we managed to do this.

We reduced it and there my mother was born -21. Sweden was like India. So my mother is actually Indian. My grandmother is Nigeria. (Laughter.) Grandmother was in Nigeria, mother was in India. And as things have changed, when I was born in 1948 here, we were in China.

So it didn't surprise us much that China had this enormous progress. This year, they bought the Volvo Company. In 1948, the Volvo Company started to export cars. It's really to grasp what it can make difference when you invest in children, what it pays off many, many decades later.

And then, our first daughter was born 1974 when Sweden was more or less like Chile and then I was lucky and – so lucky to have our grandchildren born when Sweden was almost like Singapore down here. This is an amazing tour Sweden have done. And you can see how one can understand it in this way. Grandma, mother, me, daughter and granddaughter.

Instead of thinking about developing countries and developed countries, we have to have several groups of socioeconomic progress. And those countries learn best from those which are a little ahead of them, who were at that level some decades ago. And there are many things which have happened which we never thought would happen.

Just look when I go back – I go back here and I'll take Sweden to 1960 here, to 1960 – sorry, I let the world free there and the world moves up with me there to 1960 and then South Korea was there, very high child mortality. Singapore, Singapore was there, you know, and Sweden, lucky in peace we were actually ahead of everyone else and that got sort of problem with afterwards. Every country being ahead of something think they will be there forever.

So I take away the other countries and let me see a race to tell you how this developed. We should go a little quicker here like this. What would happen? Sweden progressed. We had

good economic development. We implemented more and more. Actions were this. And we saw and heard about Singapore coming up and we were happy that South Korea came up and we never thought it would come so close to us, you know.

And South Korea were down here. They were not so rich but they got richer than Singapore and we got very nervous. And there, they overtook us and we never ever thought that a tropical island could make it and come all the way down here. Honor to Singapore, honor to Singapore. (Applause.)

In doing that, they killed the concept tropical medicine, isn't it? It's gone. It's not the climate that stops you, you know. You can overcome that and South Korea is down there. So this is very, very important to realize that it can look like this. And how is this? How did Sweden do this.

Was it fast? I calculated the annual rate of reduction. I really like that measure. I have some problem with this 25-year goal in the forward and you are on or off track. It's not for conceptual understanding. The annual rate of reduction is so good to explain.

And where I talk at the corporate level, at the highest level and politicians outside the ministry of health, I just tell them you know what economic growth is – yeah, we know. You know how many percent you was – yeah, at least 3 (percent), they say. And if you get 6 (percent) you are happy – I'm very happy. It's the same.

UNICEF is the same. It's just that they hate child death so they don't want them to increase. They want them to decrease. But they measure it in the same way – percent reduction per year. And if you have an economic growth with 6 percent, your child death should go down with 6 percent.

People understand it. I think it has great potential, this measure. And this means that Sweden had 3.4 (percent) the entire people, being honored like this – off-track. For all ministers, when you hear the development agent saying off-track, remember that they themselves has always been off-track. (Laughter.) They have always been off-track.

But the important thing to learn, can you see the Swedish line is on this side. How can countries be so more efficient with the same amount of money, technology? We have the measles vaccines. We have more knowledge about breastfeeding. We know the importance of diagnosing and treating and primary health care and we have antibiotics, all these other – so this relation between money and mortality can be pushed down.

And we are so hopeful for the pneumococcal vaccine and for some others. It can push it down. But don't over-exaggerate it because those who have child mortality today, we just heard the reality from Congo. Those are not even getting those vaccines we have today. So we want – there is – the new technologies can increase in inequity.

Did you hear? If we don't do and listen to what was said here about an integrated system, an investment in the health service and such, just providing the technology, these ones

will drop even further and these ones will remain up here. And they won't benefit from it. it really has to go together all these investment. A vertical single intervention for this child mortality issues won't work.

That's why I was so happy of the study of pneumonia and diarrhea, UNICEF back on track on realizing these are the most important and they can be done something about. So here we are and we can – we can look forward in the following way here. Let me see where we were. This is what we want to reach, the 20 per thousand. But let me reflect a little more on the MDG goals. This is child mortality estimate, the webpage. I'm live on the webpage now where we get not only the line.

I picked Rwanda for example. Not only the estimated line but what's so interesting is that we get all the servers, the DHS servers which are behind the line. This is the place where it's most easy to understand and I challenge all researchers to provide their data in as easy understandable ways. We know the tragedy in Rwanda. And then Rwanda has been so successful.

But look, it's not fair to measure their performance from that point to this and say that they didn't do millennium development goal. Not even Stalin had 25 years planning period. It's too long. It's too long. And I think when we're discussing future goals and visions, we must make a difference between the final vision where we want to reach and how we monitor it on its way. It has to be broken down.

And Rwanda should have all credits for this fall in child mortality which is faster than the MDG rate. If you count like this, many more countries are on track now than if we count in this way. This is too rigid.

And besides, Rwanda, I could show here, Nigeria is a big country and it's challenged to get the service done, representative for the whole country. It's a subcontinent almost and you can see this obviously is more uncertainty. And you can see that the lost survey was here and the lost years is just an extrapolation.

So this dream many had. It's 2014, 2015 we will know. No, you have to wait until 2019 to know if MDGs achieved. Otherwise, we are going to judge on surveys which were many years ago. So it's time. That's why it's so appropriate now to think about the new vision and not sit and wait until 2015 because we will have such a communication problem to explain what this was.

Here, you have Ethiopia really doing well and we know that the new DHS is coming which confirms that it is even lower, even lower what is looking today. And here, we have Congo and you can see that the conflict, the tragedies that Congo has been passing through also has limited number of survey.

That's why it's so important if you want to focus on the poorest also to go there and measure among the poorest and to assist Congo even in that way. They are capable of doing it themselves but they would need the assistance for getting it done.

Now, when I go back and look at – sorry, I had to go here. And I take this away. I want to say is it possible to reach 20 per thousand in 25 years. My way of doing that, I'm very simplistic as you have understood by now, is to go and look at Peru which are on 20 now. Peru are on 20 now and not only Peru but I also find Egypt there and I find Turkey. Where were these countries 25 years ago? Uh-oh, I have to go here and I look at the world and I only take those countries backwards and I go to '85, '84-'85, and quite interesting, isn't it.

They were at a very high level. Can you see, almost up there, indicating really that this drop seems possible, even if you don't go in and do these advanced estimates. But think a little. Why could they drop so fast? Because they had huge inequities. They were at the position where they were using the money very badly. And then they got it and they really reformed it and started to use them very well and had slight economic growth and then faster economic growth.

So if you have huge inequities, you have accumulated a potential success and you could have done it easily. It's much tougher for Vietnam. No, that was not Vietnam. This is Vietnam. Vietnam is already on that border due to its history of high equity and slow economic development up to the last decades.

See, if I take Vietnam backwards, you will see that they come from another direction. They come with high equity and now fast growth. They also made it. If you measure the last – here, they had a speed, so they can make it. But they can make it because they have the fast economic growth at the same time. And I was so happy hearing their excellencies from Ethiopia and India say succeeding with these social goals is linked to our economic growth. It's closely linked to it.

And it will help us to achieve economic goals and the economic progress will help us to achieve these social goals. This is the reason. So is it possible now. I was told not to be a skeptic. I don't accept that. I'm an analyst. We need not only aspirational goal.

We need achievable goals. I was told 48 hours ago that I should run my presentation from these screens. That would have been an aspirational goal, an aspirational presentation. And I'm very grateful to the team here and the organizer who got me this screen. This is an achievable presentation I do here. (Applause.)

That means you cannot only go with optimism and happiness to such an important measure. You have to measure. You have to know that you can deliver because if we go for aspirational goal, we only help the first rows. Within irrealistic aspirational goals, we maintain inequity. It was when UNICEF calculated on vaccination together with the countries and did the investments and developed the new technology.

That's when kids got vaccinated. It was an achievable goal. It was not an aspirational goal. Even we still have to share – show our aspiration. We still have to have passion and vision. But it's very good to combine it with what we can do because then we will have success

in the end. So why is this so important then? Well, it's because we have so many things to show here.

Economic growth must be here. And when I calculate these countries cannot realistically reach 20 per thousand by then. So I strongly advise that you stick to this vision of ending preventable child death but give realistic way and goals for the different countries. Otherwise, we build up a disappointment in the future for those countries. (Applause.)

These are the people in the world. We are 7 billion. And we will be 2 billion more 2015. Africa will double its population and we will get 25 percent more in Asia. I jump over this. This is what we saw. In the old time, balance was maintained because children were dying. Then children were surviving and then in the future parents will get two children but both survive. We are quite close to achieving that.

I will end by showing you this graphic. This is in more detail. Every little dollop here is hundred million people. This is Europe, a boring place. Same amount of people in all age group. This is UNICEF's group. The ministers of health have to take care of everyone. These are 15 to 30, 30 to 45, 45 to 60. This is me up here, 60-plus in Europe. This is America, almost as boring. They're just going to add one old person up here.

This is dynamic Africa – 400 million below 15 years of age and then fewer because not so many were born there. And this is Asia, also still not so many old people but the number of children have stopped growing. Total number of children in the world is not growing. What will happen is this. Me and the old, we will die. The others will grow up and get 15 years older and then they'll have their children. And then, the old will die and they will grow up and they will have their children.

It is a challenge on family level, community level, national level and continental level. This increase of people in Africa in the future will stop faster if children survive faster. This is one of the most important message. Child survival will help in stopping population growth, will help the family also having less pregnancies. And child health, maternal health and family planning goes together in the system. Asia will have less children like this.

And we will have a future which is possible. This is not to be a cynic, to put that line up. It's to save you from disappointment. The problem with people in office and in politics is that they will not be around when reality comes. But we really have to make it right because the countries up there – Congo can do it. It's no question that Congo can achieve 20 per thousand.

But it may need another decade or two and it has well to have that realistically from the beginning. Here is the challenge, the final challenge. I got the opportunity to ask the Swedes what they know about the world.

Sida used to run a Gallup every year and ask them what they thought about the world, how they felt about the world and if they liked it. Then I was asked to put knowledge questions. I asked how many babies are there per woman in Bangladesh, what is the child mortality in Kenya. I gave them four options.

These are the Swedish answers – 43 percent – it was 4.5 children, 47 percent thought it was 30 percent dying in Kenya. Ten percent was only 7 percent here, 2.5 percent was only 5 percent out there. And of course, this is the right answer. The Swedes think the world is at it was 25 years ago. (Laughter.) Don't laugh too much. I challenge you to go home and test your own people. (Laughter.)

But I went to the zoo in Stockholm and asked the chimps and they had 25 percent right in this. (Laughter.) So this is not ignorance. This is preconceived ideas that the progress had not been made. And these – most of the voters behind the age are like this. It's shocking. And this is in the country with a YouTube professor.

We really have to do this. And we may achieve it by reshaping how we talk about the world. You talk in UNICEF about developed regions and developing regions. And Korea and Singapore is in the developing and Albania and Romania is developed. That's strange. (Laughter.)

That's where South Korea and Singapore is and that's where Albania and developed is. What does it take to change categorization? Do you have to color your hair blonde and get birch trees or what is it? (Laughter.) No, I'm very serious on this. This is one of the things that stops understanding, this general talking about developing world.

We need to show the progress being done in countries and not to look – Sub-Saharan Africa cannot be looked at in one unit. We have some countries forging ahead, other countries remaining deep problems, you know. But there are fewer and fewer and more and more are successful.

We really have to work it out so we can understand it. These families want us to succeed. And this is how the world will look – happy, two-child families with surviving children. Thank you very much.